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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/775,169	02/01/2001	Thomas Henry Tichy	CTS-2157	7279

7590 07/02/2003

Mark W. Borgman
CTS Corporation
905 West Boulevard North
Elkhart, IN 46514

EXAMINER	
NELSON, ALECIA DIANE	
ART UNIT	PAPER NUMBER
2675	

DATE MAILED: 07/02/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	09/775,169	TICHY ET AL.	
	Examiner	Art Unit	
	Alecia D. Nelson	2675	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *01 February 2001* .

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-16* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-16* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

11)☐ The proposed drawing correction filed on _____ is: a)☐ approved b)☐ disapproved by the Examiner.

If approved, corrected drawings are required in reply to this Office action.

12)☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

13)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____ .

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

14)☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).

a) ☐ The translation of the foreign language provisional application has been received.

15)☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____ .
4) ☐ Interview Summary (PTO-413) Paper No(s). _____ .
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: .

DETAILED ACTION

Information Disclosure Statement

1. The information disclosure statement (IDS) submitted on 02/01/01 is in compliance with the provisions of 37 CFR 1.97. Accordingly, the information disclosure statement has been considered by the examiner.

Claim Rejections - 35 USC § 103

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

Claims 1-16 are rejected under 35 U.S.C. 103(a) as being unpatentable over Brimhall (U.S. Patent No. 5,396,266) in view of Barber et al. (U.S. Patent No. 5,973,670).

With reference to **claims 1, 5, 7, 8, 11, 12, and 14-16** Brimhall teaches a method and apparatus for controlling a cursor in a computer comprising providing a cursor control apparatus for receiving user input and providing signals indicative of the input (see column 4, lines 3-32), providing feedback (see column 6, lines 46-49), and suppressing the sensing of cursor control during the activation of feedback (see column 4, lines 50-65).

Brimhall fails to specifically teach the usage of a circuit for providing tactile feedback, however does teach generating feedback as explained above. With further reference to **claim 16**, Brimhall fails to teach the usage of a piezo-electric device for providing the tactile feedback.

Barber et al. teaches a cursor controller including a tactile generator, wherein the generator is activated when the cursor is located a graphics object (see abstract). There is further taught the usage of a relay (42) or a piezoelectric element (52) used for generating a tactile signal (see column 4, lines 35-61).

Therefore it would have been obvious to one having ordinary skill in the art at the time of the invention for the joystick apparatus as taught by Brimhall to generate tactile responses similar to that which is taught by Barber et al. in order to thereby provide a method for tactilely stimulating a cursor control device when a cursor is controlled by the user in a graphical environment.

With reference to **claim 2**, Brimhall teaches activating the tactile feedback in response to predefined user inputs from the cursor control apparatus (see column 4, lines 50-65)

With reference to **claims 3 and 4**, Brimhall fails to specifically teach that the predefined user input is a selection indication, or that the predefined user input is placement of the cursor over an active area on the display device. Brimhall teaches implementation of the cursor controller in a game environment which is known to have different selection options at start-up of the game, and would thereby be obvious to allow for these selections to generate a tactile response to verify the users selection.

Moreover Barber et al. teaches tactile decisions made based on whether the tactile object is a button, and generating a tactile signal corresponding to the decision (see column 6, lines 25-39). It is also taught that tactile module (12) causes the cursor control device (14) to vibrate or otherwise to be tactilely stimulated when the cursor (34) crosses a boundary of the graphics object (32) (see column 4, lines 16-29), wherein the boundary of the graphics object represents an active area.

Therefore it would have been obvious to one having ordinary skill in the art at the time of the invention to allow tactile responses to be generated upon making a selection, or upon movement over an active area, as taught by Barber et al. in a device similar to that which is taught by Brimhall in order to provide tactile responses to the user which verifies the selection made on the display.

With reference to **claims 6, 9, and 10**, neither Brimhall nor Barber et al. teach that the piezo-electric device is activated by an ac signal, or that the signal is 300-400 hz. However, Barber et al. does teach the usage of a piezo-electric device and it would be inherent to have a signal to activate the device. Further, the usage of an ac signal to control a piezo-electric device is well known in the art.

Therefore it would be obvious for one having ordinary skill in the art at the time of the invention to allow the piezo-electric device to be activated by an ac signal. This would be obvious to one having ordinary skill in the art being that the device must be activated by some type of signal. This activation signal would thereby provide a method for generating tactile feedback to a user when navigating through a graphical environment.

Conclusion

3. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Alecia D. Nelson whose telephone number is (703)305-0143. The examiner can normally be reached on Monday-Friday 9:30-7:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Steve Saras can be reached on (703)305-9720. The fax phone numbers for the organization where this application or proceeding is assigned are (703)872-9314 for regular communications and (703)872-9314 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703)305-9700.

adn/ADN
June 29, 2003

STEVEN SARAS
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 2600